

AMENDMENTS TO THE CLAIMS

Replace the claims with the following rewritten version:

1.-15. (Cancelled)

16. (New) Apparatus for production of ice-cream mass with solid ingredients, comprising:

a first through-flow freezer for cooling of a continuous flow of mass to between -1°C and -10°C at an outlet of the first through-flow freezer,

a second through-flow freezer for further cooling of the continuous flow of mass, and

a mixing-in arrangement for mixing of solid ingredients into the continuous flow of mass between the first through-flow freezer and the second through-flow freezer.

17. (New) Apparatus according to claim 16, where the second through-flow freezer cools the mass to between -10°C and -20°C at an outlet of the second through-flow freezer.

18. (New) Apparatus according to claim 16, where the mixing-in arrangement comprises a wing pump.

19. (New) Apparatus according to claim 16, where the second through-flow freezer comprises a freezing cylinder with an inner, rotation-symmetrical freezing surface which is regularly scraped by rotation of a scraping arrangement.

20. (New) Apparatus according to claim 19, where the scraping arrangement is a conveyor screw which comprises a plurality of screw flights, each of which extends in a helical path around a longitudinal axis, where at least two screw flights extend over the same part of the longitudinal extent of the conveyor screw, and wherein the outer edges of the two screw flights extend at a different radial distance from the longitudinal axis.

21. (New) Apparatus according to claim 20, wherein the at least two screw flights extend over an inlet end part of the conveyor screw.
22. (New) Apparatus according to claim 21, wherein at least three screw flights extend over the inlet end part of the conveyor screw, and where one of the at least three screw flights extends at a greater radial distance from the longitudinal axis than the at least two other screw flights.
23. (New) Apparatus according to claim 22, wherein the at least two screw flights which extend at a smaller radial distance from the longitudinal axis extend from the inlet end and at a different longitudinal distance from the inlet end.
24. (New) Apparatus according to claim 20, where a pitch of the screw flights at an inlet end of the conveyor screw is 0.9 to 1.4.
25. (New) Apparatus according to claim 20, wherein a pitch of the screw flights decreases along a length of the conveyor screw to 0.7 to 1 at an outlet end of the conveyor screw.
26. (New) Apparatus according to claim 20, wherein at all places along a length of the conveyor screw there is at least one screw flight which extends at a given greater radius, so that a whole of the inner wall of a cylindrical cavity in which the conveyor screw is placed is scraped by rotation of the conveyor screw.
27. (New) Apparatus according to claim 26, wherein the screw flights which extend at a greater radial distance from the longitudinal axis extend discontinuously in the longitudinal direction, so that a peripherally extending opening exists between these screw flights at least at one position along the longitudinal direction.

28. (New) Apparatus according to claim 27, wherein said opening or openings extend over 120° to 240° of the periphery.
29. (New) Apparatus according to claim 20, wherein a second through-flow freezer comprises a driving element (W) which is arranged to drive the conveyor screw at a speed of from 10 to 50 revolutions per minute.